Background

Throughout 1998, the Common Sense Initiative Council and Subcommittees worked to develop performance measures for their activities and to assess the status of their performance against those measures. The Council and Subcommittees worked individually to develop measures that the members thought would reflect the objectives and accomplishments of their own group. As a result, the types of measures that were developed vary significantly.

This report summarizes CSI's performance measurement efforts and results based on those measures. First, it presents common themes among the Council and subcommittee measures; next, it presents an assessment of performance, based on the measures developed; and finally, it presents conclusions regarding performance measurement that might be instructive for future efforts, including activities of the NACEPT Standing Committee and projects under the SBEP Action Plan and Stakeholder Involvement Action Plan.

Common Themes in Performance Measurement

The measures developed by the Council and the Subcommittees addressed goals and activities throughout the life of CSI. Some were retrospective measures that indicated the success of completed projects and some were developed to measure ongoing projects. These measures can be classified into four types:

- ***Process Measures*** that indicate progress toward milestones and successes in project implementation; these measures can be addressed earliest, although it is not always easy to define quantifiable indicators for them. Since "improved communications" was one of the most frequently cited benefits of CSI, most CSI participants thought that measures of process were very important. They also acknowledged the difficulty in developing adequate measures of process. The types of process measures developed by the CSI participants include initiation and completion of specific projects and project components and satisfaction of various stakeholders with the process and its results.

- ***Output or Product Measures*** that indicate accomplishment of a milestone, production of a tangible product, etc.; these measures are generally easy to define and data are readily available. The problem with this type of measure is that it does not address whether an output or product had the desired effect. The CSI Subcommittees produced numerous reports, recommendations, and other products. Measures include recommendations from the Subcommittees to the Council, from the Council to the Administrator, and from the Administrator to the Agency; and descriptive reports, evaluations, assistance tools, analyses of issues, databases.

- ***Institutional Effects Measures*** that demonstrate changes in the behavior of organizations (including EPA, industry, and environmental or public interest groups) as well as

individuals, changes in burden or cost for these organizations, and specific benefits for these organizations. Measures include Agency response to specific recommendations and reported changes in burden on industry.

- ***Environmental Results Measures*** indicate environmental improvements; these are the most difficult to measure and require the longest time to be evident. It is also difficult to assign causality (determining the impact of a CSI project vs. other programs with similar goals or messages).

Highlights of Performance Assessment Based on Measures

The CSI Subcommittees undertook numerous projects, some with very specific objectives and performance measures. The highlights presented in this section cannot capture the many specific accomplishments of these projects. The reader is encouraged to review the more specific summary of measures and status that is appended to this report for more detail on project measures and accomplishments.

CSI Council. The CSI Council developed performance measures under three goals. First, CSI as a whole **demonstrated and documented the value and benefits of using a sector-based approach (Goal 1)** by implementing pilot projects in each of the eight areas addressed by CSI,[1] documenting lessons learned from the pilot projects, and testing the feasibility of developing a holistic sector-based strategy for the Metal Finishing Sector. The Council **encouraged the appropriate use of sector-based approaches in carrying out EPA's mission (Goal 2)** by recommending further applications of the sector-based approach in the *Sector Based Action Plan.* EPA responded to a Council recommendation by establishing a standing committee on sectors under the National Advisory Council for Environmental Policy and Technology. Finally, the Council **analyzed the results of Council and Subcommittee work to develop recommendations for the Administrator that address challenges common to all sectors (Goal 3)** and presented recommendations in the areas of information and reporting (for the Reinventing Environmental Information Action Plan), data gaps and data quality, and stakeholder involvement (in a Stakeholder Involvement Action Plan).

Computers and Electronics Subcommittee. The Computers and Electronics Subcommittee undertook 10 projects under three overall goals and documented process measures of stakeholder participation in these projects. Under the goal of **developing streamlined, relevant, and easily accessible reporting and information systems (Goal 1)**, the Subcommittee developed projects intended to **consolidate and streamline duplicative federal, state, and local environmental reporting and emergency preparedness requirements**. Projects related to Consolidated Uniform Reporting for Environment (CURE) and Basic On Line Disaster and Emergency Reporting (BOLDER) developed prototypes and recommended Agency support and adoption.

---

[1]These areas are (1) regulatory framework, (2) pollution prevention, (3) recordkeeping and reporting, (4) compliance and enforcement, (5) permitting, (6) environmental technology, (7) involving communities, and (8) future issues.

CURE will replace 12 existing reports, thereby simplifying reporting. BOLDER consolidates plan requirements and provides better data and immediate access for emergency responders. Under the goal of **identifying and addressing barriers to pollution prevention and recycling (Goal 2)**, the Subcommittee recommended a modification to RCRA regulations that would remove a barrier to CRT recycling and would allow 200,000 tons per year of CRT glass to be recycled, reducing the cost of disposal and the amount of solid waste generated. It completed a study of residential post-consumer electronics collection and established a standing roundtable to promote better recovery and recycling of computer equipment. It also developed a Problem Statement on the requirement that firms using "zero-discharge" technology obtain RCRA TSDF permits and identified potential RCRA barriers to sulfuric acid recycling but did not submit a recommendation on this topic. Under the goal of **developing flexible, performance-based alternative approaches for environmental management in the computers and electronics industry (Goal 3)**, the Subcommittee developed a "green track" program for the printed wire board industry but was not able to recruit firms to test the program, so EPA is currently exploring incentives needed to recruit participants; and developed a Constructive Engagement Resource Guide.

Iron and Steel Subcommittee. The Iron and Steel Subcommittee goals were **(1) to resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance** and **(2) to promote adoption of innovative technologies within the industry.** The Subcommittee developed and is testing a consensus-based process for redeveloping former iron and steel sites; developed a consolidated report format for a steel mini mill which will be used as a preliminary baseline design for a state-wide consolidated, electronic reporting format; developed and tested community involvement guiding principles which continued to be used by the pilot facility after completion of CSI involvement; and conducted a workshop on spent pickle liquor but did not reach consensus on next steps. The subcommittee was not able to reach consensus on a multi-media permit for mini mills, a definition of substantial compliance for the industry, or a voluntary code of conduct for the industry. As a result of Subcommittee recommendations, EPA established iron and steel liaisons in Headquarters and Region 5; implemented a requirement for inclusion of public involvement in the work plan or "blueprint" for major rulemaking; is implementing recommendations on permit issues, including revision of one regulation on electric arc furnace pressure monitors (published in the Federal Register on March 2, 1999) and development of a guidance on non-witness testing; and is addressing eight recommendations on public participation by merging them into the Agency's general permit reform activities.

Petroleum Refining Subcommittee. The Petroleum Refining Subcommittee developed four goals. Under Goal 1, **identification/adoption of alternatives to current leak detection and repair (LDAR) requirements to increase regulatory flexibility and cost-effectiveness and to reduce emissions**, the Subcommittee completed two studies and submitted a recommendation to the Council on laser imaging technologies for rapid detection of VOC emissions at refineries. Under Goal 2, **development of an incentive-based program designed to replace present LDAR systems with a flexible system**, the Subcommittee is developing a draft protocol and simulation model. Under Goal 3, **development of an air emissions reporting system for the petroleum refining industry to increase the efficiency in communication between refineries,**

regulatory agencies, and the public, the Subcommittee has completed an analysis of current reporting requirements, and developed and tested a draft reporting system. The Subcommittee is awaiting the results of this pilot test. The same activities are used to measure progress under Goal 4, **to increase community understanding of and access to reported environmental information**. The Subcommittee measured reductions in review time and resources required at regulatory agencies and at refineries as well as customer satisfaction as indicators of effects.

Printing Subcommittee. The Printing Subcommittee developed two goals. The first goal was the design of the PrintSTEP (Printers' Total Environmental Partnership) project. PrintSTEP is an **alternative permitting system** for printers that includes a streamlined multi-media approach, enhanced public involvement, pollution prevention, and facility operational flexibility. The project produced three detailed documents for communities, printers, and states to help with the implementation of PrintSTEP. The sector also developed an evaluation strategy to assure that quantitative data are collected on the benefits and costs of PrintSTEP as pilot testing begins this fall. The second sector goal involved developing and testing a **community-based effort to locate small printers and encourage them to incorporate pollution prevention** (P2) into their business practices with the aid of P2 technical assistance. This project – the New York City Education Project – was tested with five community groups. The final product of this effort was a lessons learned summary of the positive and negative aspects of this approach.

Metal Finishing Subcommittee. The Metal Finishing Subcommittee developed an overall strategy for the sector that culminated in the **Strategic Goals Program** which established voluntary "better than compliance" performance targets and an Action Plan to implement the program by removing barriers and creating incentives. Lessons learned from the 14 projects implemented by the subcommittee were used in developing the Action Plan. The Strategic Goals Agreement was signed by all Subcommittee members; currently, more than 250 companies have signed the Agreement. In addition, states, local agencies, and POTWs have agreed to participate. The Subcommittee was instrumental in **regulatory revision** to allow recovery of waste under RCRA. Results of **specific projects** have included pilot tests of Metal Finishing 2000, a flexible regulatory track for top performers and a lessons learned report; pilot tests of electronic reporting systems; compliance assistance tools such as the National Metal Finishing Resource Center and a guidance manual; an exit strategy for closure of facilities with case studies and pilot tests; and a study, report, and pilot program on access to capital.

Lessons Learned

A key lesson learned during this process is the difficulty in developing impact or outcome measures for activities such as the CSI Subcommittees. An obvious difficulty, shared with many EPA programs, is that impacts, such as institutional effects and environmental results, often take years to occur and to be measurable. CSI had another difficulty – CSI was not in a position to implement most of its recommendations. Therefore, many participants were reluctant to base assessments of their effectiveness and success on the actions of others – if the CSI participants were not responsible for implementing the recommendations, should they be held accountable for final results or only for the product or output that was within their purview? On the other hand,

documentation of environmental results and institutional change is the type of information that is essential for demonstrating the value and benefit of using sector-based approaches to EPA managers and staff.

A second lesson is that, even though communication and improved relationships were considered successful elements of CSI, participants were not able to develop rigorous measures of these elements. Stakeholder satisfaction was used by a few projects.

A third lesson is that performance measurement must be built into programs from the beginning to be most helpful and that participants should accept and support the measures that are selected. Performance measurement must be viewed as an inherent part of project and program management and improvement, not simply as an external – and irrelevant – requirement. In this case, participants were asked to develop performance measures during the final year of CSI, as the program was in transition to another phase. Given this context, it was difficult to generate enthusiasm for this exercise among most of the participants.

A fourth lesson is that it is easier to measure performance in terms of specific projects than broad goals. It was more difficult to develop measures of performance for the CSI Council since the Council had few specific projects of its own. During most of its tenure, it reviewed recommendations from the subcommittees and forwarded selected recommendations to the Administrator. Defining success or effectiveness in this role is difficult. Further, it was more difficult to measure the overall impact of each sector subcommittee than of specific subcommittee projects.

These lessons suggest several recommendations for future performance measurement of sector-based activities undertaken by the NACEPT Standing Committee and by EPA staff in implementing the SBEP Action Plan and the Stakeholder Involvement Action Plan:

- Develop clear statements of environmental results and/or institutional changes that are anticipated from every project, even if data are not available to measure these factors or if the changes are in the future. This will at least link activities with an outcome that can be measured in the future and will provide a basis for communicating with EPA's environmental data staff on information needs. (Applies to projects and activities under NACEPT, the SBEP Action Plan, and the Stakeholder Involvement Action Plan.)

- For each project, develop timeline of activities, with appropriate measures along the timeline – process and product measures in early stages and throughout the project, with environmental results and/or institutional effects in later stages. This will enable the project to demonstrate progress toward anticipated results or effects as it meets its specified milestones. (Applies to projects and activities under NACEPT, the SBEP Action Plan, and the Stakeholder Involvement Action Plan.)

- Make the development of performance measures an integral part of program and project management, from the very beginning. As the participants establish goals and objectives and define their activities, they should always consider, "how will we measure our

success?" These measures can be refined, changed, and updated as the activity matures and progresses. (Applies to projects and activities under NACEPT, the SBEP Action Plan, and the Stakeholder Involvement Action Plan.)

- Share well-defined measures and measurement approaches among programs and projects, particularly in areas such as measuring improved communications (process) and environmental results. Participants can get ideas from one another to improve the overall quality of the measures used. (The Office of Reinvention should take the lead in providing a forum for this exchange of ideas.)

The Office of Reinvention can play an important role in applying these lessons. In particular, OR could:

- Assist NACEPT and EPA staff in developing relevant measures.
- Assist NACEPT and EPA staff in identifying appropriate databases to support measurement.
- Provide a forum for sharing measures that have been developed so that projects do not have to "reinvent the wheel."
- Conduct objective performance measurement studies.

Detailed Reports on Performance Measurement

Detailed reports on the performance measures developed by the CSI Council and Subcommittees follow.

SUMMARY AND STATUS OF PERFORMANCE MEASURES
CSI COUNCIL
December 15, 1998

Goal 1: To demonstrate and document the value and benefits of using a sector-based approach.

- Measure: Sector-based pilot projects will be implemented in each of the following areas: (1) regulatory framework, (2) pollution prevention, (3) record keeping and reporting, (4) compliance and enforcement, (5) permitting, (6) environmental technology, (7) involving communities, and (8) future issues – at least 3 pilot projects will be completed or underway in each of these 8 areas.
  Status: At least 3 projects have been established in each of the 8 areas.
- Measure: Lessons from the CSI pilot projects will be documented within 1 year of completion of the projects, and this information will be distributed to all appropriate EPA program offices for use in undertaking sector-based activities.
  Status: A formal evaluation of lessons learned is underway. Some project reports specifically identify lessons learned. In addition, evaluations of lessons are planned or underway for selected projects of particular interest.
- Measure: The feasibility and benefit of developing a holistic, sector-based strategy for improving environmental performance will be tested and demonstrated in at least one industry sector.
  Status: The Metal Finishing Strategic Goals Program is underway and an evaluation is being designed.

Goal 2: To encourage the appropriate use of sector based approaches in carrying out EPA's mission.

- Measure: Recommendations will be presented to the Administrator on how to apply the results of at least two pilot projects more broadly across sectors or in Agency programs.
  Status: The Sector Based Action Plan made such recommendations.
- Measure: Recommendations will be presented to the Administrator on appropriate uses of the sector based approach, including criteria for appropriate use of this approach and selection of new sectors.
  Status: The Sector Based Action Plan contains such recommendations and criteria.
- Measure: Council will continue to provide support to the Agency on the sector based approach. (This support will be provided in a manner appropriate to future Council decisions on organizational structure.)
  Status: A Standing Committee on Sectors has been established under EPA's National Advisory Council for Environmental Policy and Technology

Goal 3: To analyze the results of the Council and Subcommittee work to develop recommendations for the Administrator that address challenges common to all sectors.

- Measure: Recommendations will be presented to the Administrator in the area of information and reporting, specifically on the Reinventing Environmental Information (REI) Action Plan.

Status: The CSI Council served as a catalyst for development of the REI Action Plan, which was completed on Nov. 25, 1997.

- Measure: Recommendations will be presented to the Administrator in the area of information and reporting, specifically on data gaps, data quality, and burden reduction.

  Status: The Council made recommendations on data gaps, data quality, and burden reduction.

- Measure: Recommendations will be presented to the Administrator on the use of multi-stakeholder processes for identifying and resolving environmental issues.

  Status: The Council developed and presented recommendations in a Stakeholder Involvement Action Plan

SUMMARY AND STATUS OF PERFORMANCE MEASURES
CSI COMPUTERS AND ELECTRONICS SUBCOMMITTEE
December 15, 1998

OVERALL GOALS AND MEASURES

Goal: Develop streamlined, relevant, and easily accessible reporting and information systems that meet the needs of industry, government, and communities.

Objective: Consolidate and streamline duplicative federal, state and local environmental reporting and emergency preparedness requirements that are not easily accessible, and may not provide the most useful information to users.

- Measure: Make recommendations to the Agency that will improve reporting of environmental information (Process, Impact)
- Measure: Reporting information is improved as a result. (Process, Institutional Effect)
  Status: Subcommittee made BOLDER and 3R Database recommendations in April 1998, and CURE recommendation in July 1998. CURE will replace 12 existing federal and state reports required of the computer and electronics sector. Industry and government reporting is simplified by consolidating current reporting forms and eliminating duplication; by coordinating reporting periods; by updating reporting requirements to meet current needs; and by providing multiple methods of report submission, including electronically. BOLDER gives fire departments and other emergency response agencies instant electronic access to emergency plans for manufacturing facilities. Facilities using the BOLDER planning tool can prepare one consolidated emergency response plan that eliminates the costs and confusion of preparing multiple plans for different agencies. EPA will assist in the marketing and distribution of the BOLDER planning tool to manufacturing facilities and emergency response agencies and make a version of the software that can be accessed via the Internet. .

Goal 2: Identify and address barriers to pollution prevention and recycling.

Objective: To make sure that regulations do not discourage industry, communities, and consumers from taking environmentally favorable actions and exercising stewardship throughout the stages of production, use, and disposal of computers and electronic equipment.

- Measure: Subcommittee makes recommendations to EPA that improve skills in addressing barriers in regulations and current systems that impede pollution prevention activities. (Process)
- Measure: Addressing barriers to pollution prevention and recycling is improved as a result. (Process, Output, Institutional Effect)
  Status: The Subcommittee made a recommendation to EPA in April 1998 concerning how RCRA regulations could be modified to allow responsible recycling of CRTs. The result is that EPA has initiated a process to change RCRA

regulations to specifically allow responsible recycling of CRTs. If RCRA is modified as recommended, potentially 200,000 tons per year of this glass could be recycled in a way that reduces the cost of television and computer monitor disposal and reduces solid waste generation.

Goal 3: Develop flexible, performance-based alternative approaches for environmental management in the computers and electronics industry

Objective: EPA offers incentives to encourage companies to strive for environmental performance beyond that required by existing regulatory requirements.

- Measure: Make recommendations that incorporate alternative approaches for environmental protection to the Agency. (Impact)
- Measure: The quality and quantity of alternative approaches to environmental health improves as a result (Process, Output, Institutional Effect)

  Status: The Subcommittee developed a vision for a performance based alternative approach to environmental protection that offers companies regulatory flexibility or other incentives to encourage them to improve their environmental, health and safety performance beyond regulatory requirements. The recommendation went to the Agency in July, 1998. The result is that EPA's Office of Reinvention is exploring development of a performance track program and has recently established an incentives workgroup to determine what opportunities exist for expanded use of incentive programs within the Agency. The performance track program recommendations made by the Computer and Electronics Subcommittee will feed into EPA's process for developing such a program in the future.

PROJECT GOALS AND MEASURES

Project: CRT Glass-to-CRT Glass Recycling

Goal: Glass-to-CRT Glass Recycling Contributes to Subcommittee Goal# 2:

Objective: Develop recommendations for the EPA Office of Solid Waste to reduce/remove the regulatory barriers to CRT recycling.

- Measure: Subcommittee makes recommendation to CSI Council, Administrator, OSWER (Output)

  Status: Subcommittee made the recommendation to the CSI Council and to the Agency at the June, 1998 CSI Council meeting.

Project: Electronic Product Recovery and Recycling Residential Collection Pilots

Goal: To test several residential, post-consumer collection pilot programs for end-of-life electronic equipment.

Objective: Determine the composition of the waste stream, and the types and volume of equipment to be collected

- Measure: Conduct Municipal collection days (2 per site, 2 sites), including advertising and outreach. (Output, Institutional Effect, Impact)

  Status: Collection Pilots Completed May/November 1997. EPA Report # 901-R-98-

002, "Residential Collection of Household End-of-Life Electrical and Electronic Equipment – Pilot Collection Project", EPA Region 1, issued February 1998.

Objective: Determine residents' willingness to pay for this disposal option

- Measure: Conduct voluntary survey on collection days (Output)
  Status: Completed May/November 1997. EPA Report # 901-R-98-002, "Residential Collection of Household End-of-Life Electrical and Electronic Equipment – Pilot Collection Project", EPA Region 1, issued February 1998
- Measure: Conduct and evaluate San Jose Retail Outlet Collection model (Output, Institutional Effect)
  Status: Completed Pilot Project in October 1997, analysis and draft report by contractor July 1998. Currently in process of EPA review and approval for publication.
- Measure: Collect on San Francisco Curbside Collection Model, analyze and report on Pilot. (Output, Institutional Effect)
  Status: San Francisco pilot continues for the year – EPA's contractor is currently completing the draft of the analysis and report of the data collected to date. Draft contractor report (December 1998)

Project: Barriers to Closed-Loop Recycling in the Electronics Industry

Goal: Address federal regulatory barriers that inhibit achievement of pollution prevention and water conservation through the use of closed-loop industrial process water recycling. The specific barrier is the requirement that firms using "zero-discharge" technology obtain RCRA TSDF permits.

Objective 1: Identify examples of different technologies used by electronics manufacturing facilities that use closed-loop treat-and-recycle systems for their process water.

- Measure: Locate 4 or more facilities that use closed-loop systems (Process)
  Status: Completed visits in January/February 1998. Draft contractor report expected December 1998.
- Measure: Facilities are in different states in different EPA Regions (Process)
  Status: Completed visits in January/February 1998. Draft contractor report expected December 1998.
- Measure: Facilities use different examples of technology (Process)
  Status: Completed visits in January/February 1998. Draft contractor report expected December 1998.

Objective 3: Conduct telephone survey with eight states to determine how these states are interpreting and applying the current RCRA exemptions to Treatment, Storage, and Disposal Facility (TSDF) permitting with respect to facilities that operate zero wastewater discharge recycling systems.

- Measure: Better understanding of regulatory position of state agencies (Process)
  Status: Completed survey in August 1998. Draft contractor report expected December 1998.
- Measure: Thorough review of state agency general guidance or specific approval (Process)
  Status: Completed survey in August 1998. Draft contractor report expected

December 1998.

- Measure: Assess the applicability of existing RCRA TSDF exemptions and exclusions to the systems. (Process)
  Status: Completed survey in August 1998. Draft contractor report expected December 1998.
- Measure: Involvement of EPA HQ/Regional staff, State, county, local officials/inspectors (Process)
  Status: Completed survey in August 1998. Draft contractor report expected December 1998.

Objective 4: Develop Problem Statement based on the findings of the Site visits and the Survey of State agencies

- Measure: Work Group develops consensus Problem Statement (Process, Impact)
  Status: Consensus on Problem Statement in October 1998. Draft contractor report expected December 1998.

Objective 5: Present recommendation to Subcommittee/CSI Council/Administrator

- Measure: Subcommittee makes recommendation to CSI Council/Administrator (Output)
  Status: EPA staff have conducted conference calls and circulated Problem Statement and proposed recommendation to Subcommittee for review. The Subcommittee will discuss and decide on the recommendation at its December 2-3 1998 meeting. If the Subcommittee approves the proposed recommendation, it will be presented to the CSI Council and the Administrator at the full Council meeting December 17, 1998.

Objective 6: Find a home in the Agency for Zero Discharge Program

- Measure: An EPA office officially agrees to manage and adopt the program (Process, Impact)
  Status: Preliminary discussions only

Project: Umbrella Study of Electronic Equipment Collection Pilots -- Evaluation of Collection Methods for Electronic Equipment Recovery

Goal: Analyze electronic product recovery and recycling collection pilot programs around the country to help potential users assess different collection methods and create appropriate programs and infrastructure for the future. .

Objective 1: Collect data from all known U.S. pilot projects and state, county, or local collection programs

- Measure: Data collected from all known sources (Process)
  Status: All data collected September 1998. EPA staff will present draft contractor report to Sector Subcommittee at December 1998 meeting.
- Measure: Data organized and analyzed (Process)
  Status: All data organized and analyzed October 1998. EPA staff will present draft contractor report to Sector Subcommittee at December 1998 meeting.

Objective 2: Develop and publish summary findings to the Subcommittee, communities and the recycling industry

- Measure: Publish Report (Output)
  Status: All data organized and analyzed October 1998. EPA staff will present draft contractor report to Sector Subcommittee at December 1998 meeting.

Project: Electronic Product Recovery and Recycling (EPR2) Conference and Roundtable

Goal: Establish an independent standing roundtable whose function is the long-term promotion of better management of EOL computer equipment.

Objective 1: Educate, facilitate information exchange, and help establish productive relationships among diverse stakeholders concerned with management of end-of-life (EOL) computer equipment

- Measure: Publicize, conduct annual National Conferences (Process, Output)

  Status: National Conferences held in 1997, 1998. Funded for the first three years through an EPA cooperative agreement, the Roundtable was set up under the auspices of the Environmental Health Center, a division of the National Safety Council.

- Measure: Hold meetings of EPR2 Roundtable in 1997, 1998 (Process, Output, Institutional Effect)

  Status: Roundtable meetings held in 1997,1998

Objective 2: Roundtable becomes financially independent in FY 1999

- Measure: Roundtable succeeds in fund raising, becomes self-sufficient (Process, Output, Institutional Effect)

  Status: Roundtable appointed lead person for fund-raising at initial meeting. Member organizations have contributed over $50,000 to a major EPR2 Roundtable project this year, even though the EPA grant is still in place.

Project: Combined Uniform Reporting for Environment (CURE)

Goal: Consolidate environmental reporting to reduce burden and increase access

Objective: Analyze existing environmental reporting and recordkeeping system

- Measure: Inventory existing requirements at federal, state and local levels by 7/97 (Output)

  Status: Reporting Requirements Inventory presented to CSI Council 7/98 and made available on EPA's Printed Wiring Board Compliance Assistance Center on the Internet on 3 diskettes and website: pwbrc.org. Computer and Electronics firms currently need to identify, locate and sort through the requirements of over 1,100 environmental reports to determine which ones apply to their facilities and when.

Objective: Conduct stakeholder needs assessment

- Measure: Issue Stakeholder Needs Report by 11/97 (Output)

  Status: Presented to CSI Council 11/97. Summary of stakeholder survey results in a report issued by the Texas Natural Resources Conservation Commission (TNRCC)

Objective: Identify data elements required to address stakeholder information needs

- Measure: Issue preliminary data element list by 9/98 (Output)

  Status: Data Elements List reviewed by CSI C&E Reporting Workgroups at both national and state (Texas) levels. 7/98 Workshop and 9/98 Austin Data Elements Summit.

Objective: Conduct gap analysis between existing systems and preliminary data elements

- Measure: Draft gap analysis report (Output)

  Status: CSI Project CURE gap analysis under discussion in EPA Data Gap Strategy

Task Force as part of EPA's Reinventing Environmental Information Initiative (REI). Draft gap analysis report targeting environmental data elements currently not required by law for discussion in state stakeholder groups (Texas, Pa., Co.)

Objective: Create CURE prototype

- Measure: Draft consolidated reporting form (Output)
  Status: website draft undergoing review: **http://www.rfdinc.com/tnrcc.** Feedback on prototype reporting form and discussion of data elements being summarized in a final CURE report; Consensus language informed 11 Aug.'98 memo from EPA Administrator creating a task force on Comprehensive Information Management Planning (CIMP) at EPA

Objective: Develop CURE recommendation for CSI Council

- Measure: Presentation of consensus language (Output, Process)
  Status: CURE recommendation presented by CSI Computer & Electronics Sector Subcommittee to full Council on 15 October 1998. CURE recommendation accepted by CSI Council and forwarded to Agency

Objective: Issue draft CURE report by 3/99

- Measure: Document available for distribution (Output)
  Status: Editing final report.

Objective: Integrate CURE into relevant EPA information programs

- Measure: (Process, Institutional Effect)
  Status: CURE Recommendation Consensus Language incorporated into 14 Oct.'98 memo from EPA Administrator calling for creation of consolidated information memo and 9 Dec.'98 memo from EPA Administrator selecting reorganization option and appointing transition task force for new management structure to integrate environmental data, reduce reporting burden and improve public access. Post-CSI Project CURE products to be included in inventory of information activities critical to success of new organization by reorganization transition team and incorporated into functional statements by 8/99

Project: Basic On Line Disaster & Emergency Response (BOLDER)

Goal: Consolidate reporting to 8 federal agencies for emergency response planning

Objective: Develop software for current paper-based emergency response planning

- Measure: Deliver working copies of basic BOLDER software to EPA Regions VI and I (Output)
  Status: Beta test BOLDER in 2 locations:Corpus Christi, Texas (Petroleum sector), Massachusetts Office of Technology Assessment (Metal etching and chemical manufacturing companies). On-site beta BOLDER project structures established in both Regions VI and I for testing transferability of basic BOLDER software developed at Phoenix Fire in Maricopa County in Arizona to other industry sectors in other geographic locations.

Objective: Make recommendation from the Computer & Electronics Sector Subcommittee to full Common Sense Initiative (CSI) Council

- Measure: Come to consensus on recommendation language by stakeholders (Process)

Status: BOLDER consensus language developed in workgroup. BOLDER recommendation accepted by subcommittee and presented to Council. Activities underway to implement the following objectives.

Objective: Transfer BOLDER project from Corpus Christi to Regional Response Team (RRT) Preparedness Committee for development into recommendation as an electronic format for Integrated Contingency Planning (ICP) to be submitted to the 13 agency National Response Team (NRT) co-chaired by US-EPA headquarters Office of Chemical Emergency Preparedness and Prevention Office (CEPPO)

- Measure: Obtain formal commitment to BOLDER from RRT Preparedness Committee (Process)

Status: Met with RRT Preparedness Committee Chair at RRT meeting. Presentation and discussion of BOLDER at RRT meeting resulted in agreement to develop RRT electronic ICP recommendation for consideration by NRT

Objective: Incorporate pollution prevention (P2) into electronic Integrated Contingency Plans (ICP) at 2 companies via Massachusetts Office of Technology Assessment

- Measure: Adopt basic BOLDER as ICP-P2 in EPA Region I (New England) (Process)

Status: Transferred BOLDER from Arizona AOC to Massachusetts OTA. Beta testing of BOLDER underway at a chemical company and metal etching firm in Massachusetts

Objective: Web-enable BOLDER as freeware with a tutorial

- Measure: Set aside funding for "better" BOLDER (Process)

Status: Maricopa County Grant extended thru 9/99 with funding earmarked for development of web-enabled BOLDER freeware with a tutorial. Delivery of "basic" BOLDER freeware to Arizona Oversight Committee (AOC) scheduled for January 1999. Establishment of "better" BOLDER project structure underway. Distribution to other State Emergency Response Committees (SERCs) under discussion.

Project: Performance Track ("Green Track") Program

Goal: Develop flexible, performance-based alternative approaches for environmental management in the computers and electronics industry

Objective: Conceptualize a performance track ("green track") program for the printed wire board industry.

- Measure: Draft a performance track program concept paper. (Output)
- Status: A draft concept paper was completed in December 1997. The plan was discussed with representatives of the semiconductor industry. They generally approved the ideas presented in the concept paper, but none of them were prepared to participate in a pilot program to test the concept. The main reason given for not participating was that potential participants saw the costs as too high and uncontrolled and the rewards as too low and unpredictable to justify participation. Potential participants wanted greater assurance that the Agency would be willing and able to provide the level of flexibility envisioned in the concept paper.

Objective: Recommendation to EPA on how to structure a performance track program for the PWB industry.

- Measure: Subcommittee consensus recommendation on a performance track program to CSIC (Output)
  Status: In July 1998 the subcommittee approved a performance track program recommendation.
- Measure: EPA further develops a performance track program as part of its sector based approach (Institutional Effects)
  Status: EPA's Office of Reinvention is exploring development of a performance track program and has recently established an incentives workgroup to determine what opportunities exist for expanded use of incentive programs within the Agency. The performance track program recommendations made by the Computer and Electronics Subcommittee will feed into EPA's process for developing such a program

Project: Sulfuric Acid Recycling

Goal: Develop flexible, performance-based alternative approaches for environmental management in the computers and electronics industry

Objective: Eliminate barriers to concentrated sulfuric acid recycling in the semi conductor industry.

- Measure: Identify potential RCRA barriers to sulfuric acid recycling and perform a regulatory clarification, or policy or regulatory change. (Process, Output)
  Status: Potential regulatory barriers to sulfuric acid recycling were identified in a May 1997 issue paper.
- Measure: Eliminate identified barriers through regulatory clarification , or policy or regulatory change. (Process, Institutional Effects)
  Status: No recommendation on this topic was made by the subcommittee.

Project: Constructive Engagement Resource Guide (Project formerly know as SPECIE)

Goal: Develop flexible, performance-based alternative approaches for environmental management in the computers and electronics industry

Objective: Produce a resource guide on constructive engagement

- Measure: Final resource guide completed by November 2. 1998 (Output)
  Status: The resource guide was still in production on November 1. The final draft of the text was scheduled for delivery by December 15. 1998. The extension of the schedule was made to allow more review by the subcommittee during production of the guide.

Objective: Effectively utilize expertise and input of alternative Strategies Project workgroup

- Measure: Workgroup members participation in conference calls (Process)
  Status: The primary job of developing the resource guide was assigned to a balanced task group within alternative strategies workgroup. The Conference call participation of task group members has been good overall (approx. 60-80%). Workgroup also participated by reviewing materials transmitted by fax, mail, and E-mail, and one-on-one phone calls.
- Measure: Workgroup members participation at conferences (Process)
  Status: Since inception of the project, attendance has been good (approx 70 - 80%)
- Measure: Verbal and written reports of workgroup members conveying satisfaction with

workgroup progress (Process)

Status: Workgroup and subcommittee members have voiced enthusiastic approval of review drafts of the resource guide. One member questions the value of constructive engagement and therefore the resource guide. Another indication of approval is the interest expressed by members of all stakeholder groups in promoting the guide among their peers.

Objective: Improve understanding and expertise in constructive engagement among stakeholders (citizens, industries, governmental and non governmental agencies)

- Measure: Verbal and written reports to EPA on usefulness of the guide (Institutional Effects, Impact)
  Status: Cannot be measured until after the Resource Guide is published and distributed
- Measure: Copies of resource guide requested (Output, Institutional Effect)
  Status: Cannot be measured until after the Resource Guide is published and distributed
- Measure: Number of visits to the established website (Output)
  Status: Cannot be measured until after the Resource Guide is published and distributed
- Measure: Increased number of successful outcomes for all parties entering into constructive engagement partnerships (Process, Institutional Effect, Impact)
  Status: Cannot be measured until after the Resource Guide is published and distributed

Objective: Enhance the use of partnerships among stakeholders to identify and achieve environmental goals.

- Measure: Increased reports of environmental partnerships being developed (Institutional (E)effects)
  Status: Cannot be measured until after the Resource Guide is published and distributed
- Measure: Increased reports/articles of new case studies on industry, NGO and Agencies websites. (Output, Institutional Effects)
  Status: Cannot be measured until after the Resource Guide is published and distributed

SUMMARY AND STATUS OF PERFORMANCE MEASURES
CSI IRON AND STEEL SECTOR SUBCOMMITTEE

Project: Brownfields

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Develop a community-based process for redeveloping former iron and steel sites

- Measure: Consensus-based guiding principles developed by Subcommittee (Output)
  Status: Developed December, 1995
- Measure: Model Legislation (Output)
  Status: Developed December, 1996

Objective: Test process in pilot sites

- Measure: Sites Identified (Output)
  Status: Northwest Indiana and Birmingham Indiana identified (FY '97)
- Measure: Relevance of principles to pilot projects (Effect)
  Status: Contractor evaluation underway

Project: Supplemental Environmental Projects (SEPs) and Redevelopment

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Identify ways to use SEPs to facilitate Brownfields clean-up

- Measure: Consensus recommendations to EPA (Output)
  Status: Work group suggestions passed along to EPA
- Measure: Recommendations implemented by EPA (Effect)
  Status: SEP policy amended by EPA; U.S. Steel included Brownfields redevelopment in Birmingham, AL as part of a SEP

Project: Consolidated Multi-Media Reporting

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Develop a consolidated report for a steel mini mill

- Measure: Report format developed (Output)
  Status: Draft format developed in Excel in April, 1998
- Measure: Steel mills use report (Effect)
  Status: Utah DEQ will be working with the pilot mill to investigate electronic submission of data using the Excel process during FY '99; possible use for other steel mills in the state
- Measure: Steel mills report electronically (Effect)
  Status: As indicated above, potential use for electronic submission. Additionally, work was integrated into Utah's DEQ "One Stop Reporting" project and the study will be used as the preliminary baseline design in the state's efforts to develop a state-wide consolidated, electronic reporting format (which will not be Excel, however).

Data Source: Utah DEQ, contractor reports

Project: Alternative Compliance Strategy

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Ascertain if new or additional controls on proximate emissions can more than offset increases in particulate emissions from a basic oxygen furnace

- Measure: Work plan developed for phased effort (Output)
  Status: Information gathered; phase 1 information gathering completed
- Measure: Pilot identified (Output)
  Status: Information gathered did not support moving ahead. Project ended.

Project: SEPs and Improved Compliance

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Identify ways to improve compliance and involve the public in the use of SEPs

- Measure: Consensus recommendations to EPA (Output)
  Status: Work Group suggestions passed along to EPA
- Measure: Recommendations implemented by EPA (Effect)
  Status: Did not occur.

Project: Iron and Steel Web Site

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Develop an iron and steel web site to provide readily available information on innovative technology, regulations, and other items of interest to stakeholders

- Measure: Identification of interest in web site and information needs (Output)
  Status: Survey conducted in 12/95 indicating interest in a web site and areas of interest: top 4 were legislative and policy updates; compendium of innovative technologies; environmental data; pollution prevention information; and environmental data.
  Data Source: Stakeholder survey of 535 people of whom 223 responded
- Measure: Consensus agreement on the structure of the web site (Process)
  Status: Subcommittee agreed to the creation of the web site. Stakeholder representatives met in Nov. ‘96 to define structure.
- Measure: Creation of site architecture and information files (Output)
  Status: Scope of work for a contract developed in FY ‘97/98
- Measure: Web site up and running (Output)
  Status: Incomplete. Initial contract vehicle fell through. Pursuing other potential options as resources allow.

Project: Regulatory Barriers Pilot

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Reach consensus on how the regulatory definition of solid waste may be adversely impacting metals recycling and the introduction of new technologies

- Measure: Consensus agreement on problems definition (Process/Output)

Status: Did not occur.

- Measure: Consensus recommendation to EPA developed by Subcommittee (Output)
  Status: No recommendation on solid waste. However process resulted in consensus recommendations on how to obtain early stakeholder involvement in decision-making that the Subcommittee passed on to the CSI Council (September, 1996) and the Council subsequently passed on to EPA (July, 1997)
- Measure: Recommendation implemented by EPA (Effect)
  Status: EPA to implement a different approach to meet the intent of the recommendation: EPA will require that major rules include a section on public involvement as part of the work plan (known as a "blueprint") that is developed prior to beginning the rule. (That is, EPA will require early planning of when, who, and how to involve the public in a major rule's development.) Requirements for this blueprint to be developed spring of 1999.

Project: Spent Pickle Liquor Workshop

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Convene, in conjunction with an outside group, a one-day work shop to discuss the management of pickle liquor in steel making.

- Measure: Co-sponsor found (Process)
  Status: ELI co-sponsored.
- Measure: Workshop Evaluation (Process)
  Status: 21 respondents (out of 40 participants): 16 felt work shop worthwhile, 4 yes and no, 1 maybe
  Data Source: Workshop evaluation
- Measure: Consensus areas identified (Output)
  Status: Did not occur

Objective: Identify next steps

- Measure: Next steps identified (Output)
  Status: Did not occur at work shop. However, EPA has developed a "White Paper" on the issues associated with pickle liquor management as a result of the Subcommittee, an environmental group has prepared a paper summarizing the Spent Pickle Liquor conference and different possible next steps, and informally there have been indications that efforts to improve pickle liquor management will continue.
  Data Source: Final workshop procedings published by ELI

Project: Iron and Steel Liaison

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Consensus recommendation to EPA developed by Subcommittee

- Measure: Consensus recommendation to EPA developed (Output)
  Status: Recommendation to EPA forwarded by Council February, 1997
- Measure: EPA implements (Effect)
  Status: EPA has appointed a national and a regional liaison

Objective: Identify usefulness of the liaison

- Measure: Queries by stakeholder group (Output)
  Status: To date, the liaisons have received numerous queries from industry, labor and environmental/community organizations.
  Data Source: Liaison notes
- Measure Percent of successful completions (as determined by liaisons) (Effect)
  Status: The liaisons have successfully handled several issues.
  Data Source: Liaison notes

Objective: Make improvements

- Measure: Liaison continued (Effect)
  Status: One-year regional pilot extended another year; national liaison continuing
- Measure: Customer suggestions/evaluation (Output/Effect)
  Status: Labor, environmental, and industry representatives have publicly praised the position: labor at a CSI Subcommittee meeting, environmental and industry representatives mentioned its success at an October, 1998 CSI Council meeting.

Project: Permit Issues

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Identify permit issues presented by industry, regulators, and environmentalists

- Measure: Issues identified (Process/Output)
  Status: Work group initially identified 40+ issues
  Data Source: Work group survey of industry and environmentalists
- Measure: Consensus on issues to pursue (Process(
  Status: Consensus reached on pursuing 12 issues; others dropped due to believe they were inappropriate, lack of time to pursue, and -- for a few -- belief that consensus would not be reached.

Objective: Develop recommendations to pursue resolve these issues

- Measure: Consensus recommendations to EPA (Output)
  Status: 12 recommendations forwarded to the Council in December, 1996; Council forwarded to EPA at July, 1997 meeting
- Measure: Recommendations implemented by EPA (Effect)
  Status: In response, EPA to revise one regulation (anticipated publication December 1998) and to develop one guidance document on non-witness testing (December 1998); 8 recommendations on public participation merged into EPA's general permit reform activities and being considered in that broader arena; one recommendation already implemented; EPA agrees with intent of remaining recommendation and hopes to implement over time (computerization of permitting).

Project: Multi-media permitting

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Develop a conceptual, multi-media permit for a steel mini mill facility based on pollution prevention

- Measure: Pilot facility identified (Process)
  Status: Mini mill site identified
- Measure: Model developed (Output)
  Status: Report completed February, 1997. Process included voluntary pollution prevention planning as well as public involvement. Additionally, subcommittee completed an analysis of different barriers to multi-media permitting in July, 1997
- Measure: Pollution prevention plan developed (Output)
  Status: Analysis of 6 pollution prevention options included in final report
- Measure: Consensus recommendation developed by subcommittee
  Status: Did not occur. From industry's perspective, multi-media permit would be too expensive under current regulatory regime; subcommittee could not reach agreement over criteria for participation if EPA were to pursue further testing of concept with regulatory flexibility

Project: Community Advisory Committee

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Demonstrate implementation of the subcommittee's community involvement guiding principles to enhance community-plant interactions on environmental issues

- Measure: Develop Guiding Principles (Output)
  Status: Developed by subcommittee July, 1996
- Measure: Identify pilot facility (Process)
  Status: Bethlehem Steel volunteered its Burns Harbor, Indiana plant
- Measure: Pilot becomes self-supporting --without CSI involvement (Effect)
  Status: Burns Harbor and the participants are continuing the CAC without any CSI involvement. CSI's involvement ended with the awarding of a grant to provide for evaluation and some initial technical support.

Objective: Address issues of community concern

- Measure: Issues identified (Output)
  Status: The CAC has identified a series of issues including conversion of a sludge pile into a rookery, truck traffic, noise levels, and others
  Data Source: CAC minutes
- Measure: Issues addressed (Effect)
  Status: CAC pursuing issues

Objective: Improve the environment as a result of the CAC

- Measure: Under development (Impact)

Project Title: Compliance Data

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Review data collected by EPA and suggest improved display formats

- Measure: Joint process developed (Process)
  Status: OECA and the subcommittee created a small work group which reviewed the data collected and recommended their display
- Measure: OECA accepts suggestions (Process)
  Status: Drafts reviewed 3/97 and 10/97; awaiting revised version
- Measure: Formats promote sound analysis (Output)
  Status: Pending

Project: Monitoring

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Develop information on facility and ambient monitoring requirements to identify potential duplication/gaps

- Measure: Collect Information (Process)
  Status: Various monitoring requirements was collected and discussed
- Measure: Identification of potential duplication/gaps (Output)
  Status: Did not occur. Project ended.

Project: Substantial Compliance

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Identify what substantial compliance might mean for the iron and steel industry

- Measure: Development of definition (Output)
  Status: Did not occur. Project ended.

Project: Code of Conduct

Goal: Resolve issues associated with iron and steel Brownfields redevelopment, permitting, and compliance; and promote adoption of innovative technologies within the industry

Objective: Develop a voluntary code of conduct that would result in enhanced environmental performance

- Measure: Development of code (Output)
  Status: Did not occur. Project ended.

SUMMARY AND STATUS OF PERFORMANCE MEASURES
CSI PETROLEUM REFINING SECTOR SUBCOMMITTEE
December 15, 1998

OVERALL GOALS AND MEASURES

Goal 1: Identification/adoption of alternatives to current leak detection and repair (LDAR) requirements to increase regulatory flexibility and cost effectiveness and reduce emissions.

- Measure: Completion of Equipment Leaks Study (Output)
  Status: Completed November 1997
- Measure: Recommendation to CSI Council on Laser Imaging Technologies for Rapid Detection of VOC Emissions at Refineries (Process, Institutional Effect)
  Status: Completed February 23, 1998
- Measure: Completion of Innovative Technologies Study (Output)
  Status: Completed October 1998
- Measure: Adoption of alternatives to current leak detection and repair (LDAR) requirements (Institutional Effect)
  Status:

Goal 2: Development of an incentive-based program designed to replace present LDAR systems with a flexible system.

- Measure: Completion of innovative LDAR field testing (Process)
  Status: Pilot tests scheduled for 1999
- Measure: Demonstration that incentive-based program is as effective as current LDAR requirements (ie. lower cost and reduced emissions) (Process, Institutional Effect)
  Status: Draft protocol under development, simulation model under development to determine effectiveness of alternative practice from pilot test data

Goal 3: Development of an air emissions reporting system for the petroleum refining industry to increase the efficiency in communication between refineries, regulatory agencies, and the public.

- Measure: Completion of analysis of current air emissions reporting requirements (Process, Output)
  Status: Phase 1 completed October 1996, draft reporting system for pilot refinery completed August 1998, refinery evaluation completed August 1998
- Measure: Completion of an electronic database of refinery air emissions reporting requirements (Process, Output)
  Status: Pilot test and evaluation completed March 1998, subcommittee recommended no further action July 1998 based on results
- Measure: Completion of consolidated, streamlined air emissions information reporting system (Process, Output)
  Status: Draft reporting system completed August 1998, pilot test evaluation completed September 1998, evaluation of agency burden reduction to be completed December 1998, Community Advisory Panel meeting planned for First Quarter 1999
- Measure: Development of a multi-media pilot of regulatory reporting requirements (Process, Output)
  Status: Awaiting results of air emissions pilot

Goal 4: Increase community understanding of and access to reported environmental information.

- Measure: Completion of consolidated, streamlined air emissions information reporting system (Process, Output)
  Status: See above
- Measure: Completion of pilot for communicating accidental release information to community members (Process, Output)
  Status: Project workplan developed July 1998, pilot refinery identified September 1998, kickoff meeting held October 1998, community workgroup formed November 1998, project completion estimated June 1999
- Measure: Completion of a multi-media pilot of regulatory reporting requirements (Process, Output)
  Status: Awaiting results of air emissions pilot

PROJECT GOALS AND MEASURES

Project: *Equipment Leaks Workgroup*

Goal: Contributes to Subcommittee Goals #1 (from above):

Objective: Equipment Leaks Study

- Measure: Identify a set of refinery components and/or processes most likely to consistently result in equipment leaks (Process, Output)
  Status: Completed November 1997
- Measure: Identify a monitoring program that focusses on chronic leakers (Process, Output)
  Status: Completed November 1997 (data indicated that it is not possible)
- Measure: Adoption of recommendation by CSI Council on Laser Imaging Technologies for Rapid Detection of VOC Emissions at Refineries (Process, Institutional Effect)
  Status: Completed February 23, 1998

Objective: Innovative Leak Detection Technologies Study

- Measure: Identify technologies to detect fugitive equipment leaks more efficiently (Process, Output)
  Status: Identified candidate technologies, meeting with vendors scheduled for December 1998
- Measure: Identify approaches to reduce the loss of refinery process fluids/vapors through equipment leaks more efficiently (Process, Output)
  Status: Marathon Oil Texas City Refinery Leak Detection and Repair Program

Goal: Contributes to Subcommittee Goals #2 (from above):

Objective: Innovative LDAR Technology Field Testing

- Measure: Identify volunteer refineries for field tests (Process, Institutional Effect)
  Status: Two refiners have volunteered facilities for pilot test
- Measure: Completion of two field tests (Process, Output)
  Status: Pilot tests scheduled for First and Second Quarters 1999
- Measure: Completion of side-by-side testing with current LDAR methods (Process, Output)
  Status: Pilot tests scheduled for First and Second Quarters 1999

Objective: Develop an alternative to current LDAR requirements.

- Measure: Identify barriers to alternative LDAR programs (Process, Output, Institutional Effects)
  Status: Draft alternative work practices protocol under development
- Measure: Demonstrate that innovative technology(s) is/are as effective as current LDAR requirements (Process, Output, Institutional Effects)
  Status: Development of a simulation model underway
- Measure: Effect regulatory change(s) (Process, Institutional Effects)
  Status: Draft work practices protocol under development, STAPPA/ALAPCO presentation in October 1998

Project: Refinery Air Information Reporting System (RAIRS) (formerly "One-Stop Reporting") Workgroup

Goal: Contributes to Subcommittee Goals #3 (from above):

Objective: Completion of analysis of current air emissions reporting requirements

- Measure: Identify and recommend modifications to existing air reporting requirements that are duplicate and/or obsolete (Process, Output)
  Status: Draft reporting system for pilot refinery completed August 1998
- Measure: Evaluation of existing reporting requirements at a pilot refinery (Process, Output)
  Status: Pilot refinery evaluation completed August 1998

Objective: Develop and pilot test use of an electronic database of refinery air emissions reporting requirements

- Measure: Completion of draft electronic database (Process, Output)
  Status: Completed December 1997
- Measure: Evaluation of usefulness to prospective users (Process, Output)
  Status: Completed March 1998, subcommittee recommended no further action based on results

Goal: Contributes to Subcommittee Goals #3 and #4 (from above):

Objective: Develop and pilot test a consolidated, streamlined air emissions information reporting system

- Measure: Reduction in reporting time and resources at pilot refinery (Process, Institutional Effects)
  Status: Evaluation completed September 1998
- Measure: Reduction in review time and resources at regulatory agencies (Process, Institutional Effects)
  Status: Evaluation underway, completion December 1998
- Measure: Community satisfaction with new reporting system (Process, Institutional Effects)
  Status: Community Advisory Panel meeting scheduled for First Quarter 1999

Objective: Develop and pilot test a multi-media reporting system

- Measure: Reduction in reporting time and resources at pilot refinery (Process, Institutional Effects)
  Status: Project initiation planned for Second Quarter 1999
- Measure: Reduction in review time and resources at regulatory agencies (Process, Institutional Effects)

Status: Project initiation planned for Second Quarter 1999

- Measure: Community satisfaction with new reporting system (Process, Institutional Effects)

  Status: Project initiation planned for Second Quarter 1999

Project: Refinery Accidental Release Information Communication Workgroup

Goal: Contributes to Subcommittee Goals #4 (from above):

Objective: Develop and pilot test a model for communicating accidental release information to community members

- Measure: Improve the dissemination of information between the pilot refinery and the community following a reportable release (Process, Institutional Effects)

  Status: Completion expected June 1999

- Measure: Community satisfaction with the timeliness and value of information received (Process, Institutional Effects)

  Status: Completion expected June 1999

SUMMARY AND STATUS OF PERFORMANCE MEASURES
CSI PRINTING SECTOR SUBCOMMITTEE
December 15, 1998

OVERALL GOALS

Goal 1: Complete the design of the PrintSTEP environmental regulatory approach

Objective/Action: Gain subcommittee and external reviewers concurrence on design of PrintSTEP

- Measure: All stakeholders will be able to identify potential benefits in the design of PrintSTEP (Output, Process)
  Status: Project design is complete, external review complete, revisions to PrintSTEP materials underway. Final approval by Subcommittee expected 12/4/98
  Other: External review included comments from 10 organizations and individuals covering all stakeholder groups. Significant comments were discussed and resolved at the October 29 & 30 subcommittee meeting

Objective/Action: Assure participation and support for PrintSTEP across the Agency and Regions

- Measure: Relevant program offices and regions will provide official sign-off on project design (Output, Process, Institutional Effect)
  Status: Comments from program and regional offices on the PrintSTEP documents, have been reviewed and addressed. Discussions and follow-up actions with commentors will take place after the December subcommittee meeting.

Goal 2: Initiate pilot projects in 2-3 states

Objective/Action: Identify interested state partners

- Measure: Outreach efforts will result in expression of interest from at least 3 states (Output, Process)
  Status: Initial outreach has identified four states that are potentially interested in undertaking pilots. The FR notice formally requesting grant applications, will be published in early January.

Objective/Action: Negotiate state versions of PrintSTEP

- Measure: 2 -3 states will be selected for pilots and agreements will be developed ensuring the inclusion of key PrintSTEP goals and the ability to make cross-comparisons among states. (Output, Process)
  Status: This activity will not begin until grants are submitted

Goal 3: Evaluation component of pilots will be designed to obtain quantitative and qualitative data

Objective/Action: In cooperation with pilot states and project team, a statistically valid evaluation methodology will be developed to measure the efficiency and effectiveness of the key

components of PrintSTEP and gather lessons learned that may impact other industry sectors.

- Measure: States and project team will agree on the qualitative information to be captured and the quantitative parameters to be evaluated. The design will include enough consistency to assure meaningful comparisons among states. (Output)
  Status: The project team has developed a preliminary evaluation strategy. Once the grantees are selected, the evaluation strategy will be completed.
- Measure: Baseline and project data will be collected to determine the impact of the project on key elements of PrintSTEP (i.e. P2, public involvement, cost considerations) (Output)
  Status: Future activity

Goal 4: Based on the results of the pilots, the Subcommittee will make interim and final recommendations to the CSI Council

Objective/Action: Based on the results and lessons learned from the pilots, the subcommittee will make recommendations to the CSI Council on the use of the PrintSTEP approach for the sector on a nationwide basis.

- Measure: The subcommittee will develop and present interim and final recommendations to the Council. (Output, Process, Impact)
  Status: Future activity

Objective/Action: Based on the results and the lessons learned from the pilots, the subcommittee will make recommendations to the CSI Council on the elements of PrintSTEP that may be transferrable to other industrial sectors.

- Measure: The subcommittee will develop and present interim and final recommendations to the Council (Output, Institutional Effects, Impact)
  Status: Future activity

Goal 5: Pilot test the effects of community involvement in linking neighborhood printing facilities to technical assistance provides for the purpose of improving environmental performance (New York City Education Project)

Objective/Action: Local community groups and technical assistance providers, in consultation with the Subcommittee will define common goals and approaches to the pilot project

- Measure: An overall project plan will be developed that meets the needs of all project participants. The plan will include milestones and delineate roles and responsibilities for all parties. (Output)
  Status: The project has been completed

Objective/Action: Design an evaluation component that will test the innovative approach to community involvement in encouraging environmental improvements

- Measure: Project participants and project team will agree on the parameters to be evaluated. The design will include meaningful data collection efforts to assure valid conclusions can be made. (Output, Process)
  Status: Project team has design a final report format to capture accomplishments, problems and lessons learned. The report will be formally presented to the

subcommittee in December 1998

- Measure: Project data will be collected to determine the benefit of utilizing community members to motivate printers to take advantage of technical assistance to improve their environmental performance. (Output, Process)

  Status: Measure dropped

Goal 6: Based on the results of the education pilot, the Subcommittee will make recommendations to the CSI Council

Objective/Action: Based on the results and lessons learned from the NYC education pilot, the subcommittee will make recommendations to the CSI Council on the use of a community approach to outreach for broader sector application.

- Measure: The subcommittee will develop and present recommendations to the Council. (Output, Institutional Effects, Impact)

  Status: Future activity - format will depend on the transition of the Council to NACEPT.